Water Pollution (and Prevention!) Begins With You

CITY OF EUGENE
STORMWATER
MANAGEMENT PROGRAM

WHEN IT RAINS . . .

The EnviroScape Watershed Model

FACT SHEET

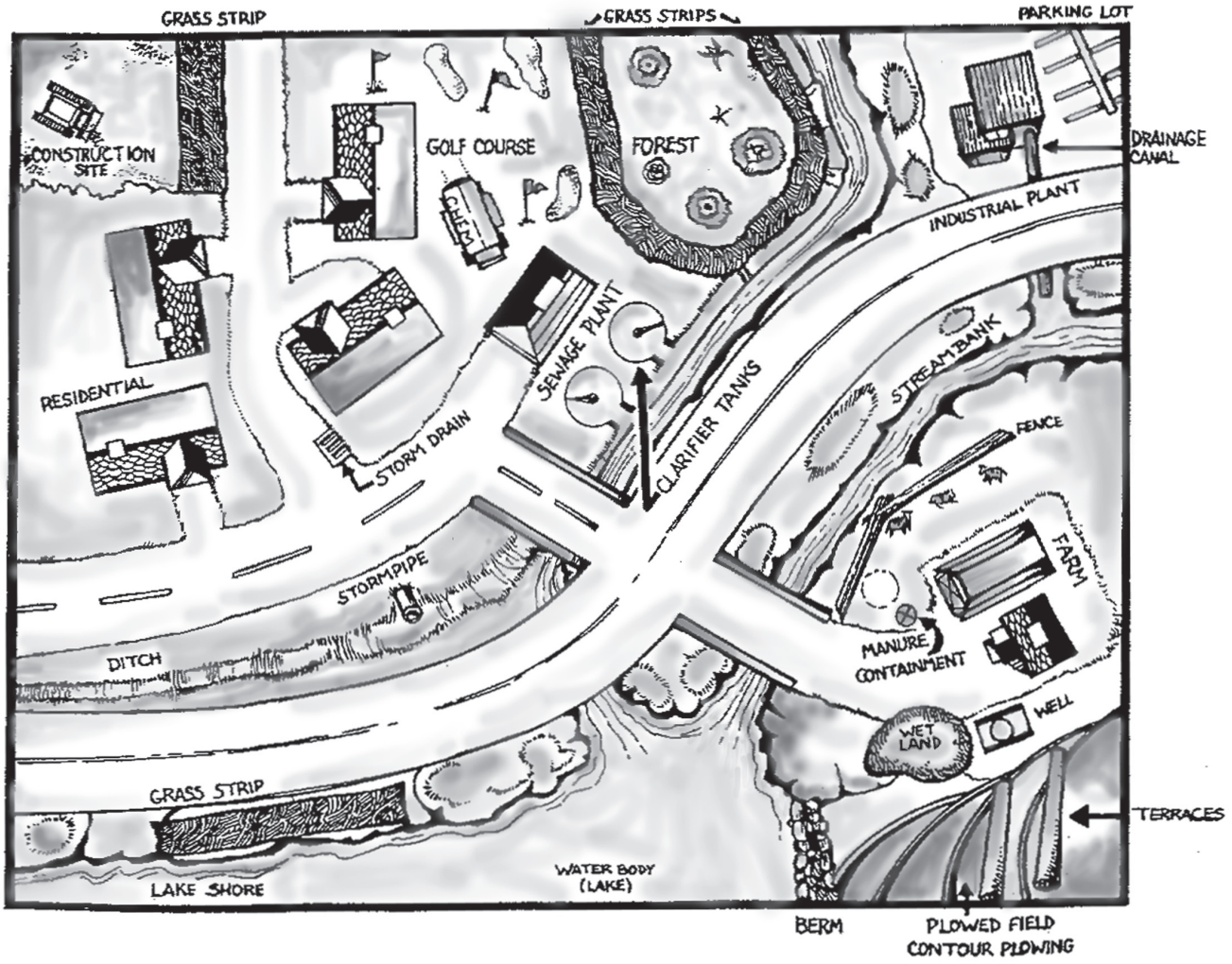
Pollution Comes From Two Sources:

Point Source Pollution flows from pipes or comes from specific points as demonstrated on the watershed model from the:

- industrial plant in upper right corner
- sewage treatment plant at the base of the forest and golf course
- stormwater drain outfall on the residential road between the homes

Nonpoint Source Pollution does not result from a discharge at a specific, single location, but generally results from land runoff, drainage or seepage, after it rains. Our daily household practices and waste disposal methods are also nonpoint sources of pollution. The watershed model demonstrates nonpoint source pollution from the:

- construction site in upper left corner
- streambanks and lake shore
- plowed fields in lower right corner
- lawns and golf course
- highways, roads and parking lot
- cows and other domestic animal manure



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What Happens When it Rains?

Watershed Model Area	Problem	Solutions
Construction Site	Lack of vegetation or silt fencing to hold the soil allows it to wash away.	■ Maintain existing vegetation ■ Clear only the area you need ■ Replant as soon as possible ■ Use straw bales, silt fencing or plastic covers to prevent erosion.
Lawns and Golf Course	Excess pesticide or fertilizer runs off into the waterway. Seeping into the ground, they reach underground wells.	■ Test the soil first. ■ Use chemicals sparingly ■ Leave grass clippings to decompose and provide a natural lawn fertilizer.
Highways, Roads and Parking Lots	Impervious (nonporous) surfaces collect oil and antifreeze from vehicles and carry them into storm drains and into waterways.	■ Maintain vehicles ■ Use drop cloths to catch spills ■ Recycle oil and antifreeze
Streambanks/Lakeshore	Bare stream banks encourage erosion from wind and rain.	■ Maintain/replant vegetation ■ Place loose logs or rock walls to prevent runoff ■ Protect wildlife habitat
Forest Clearings	Clearcutting leaves soil exposed to erosion. Improperly constructed roads can cause more erosion.	■ Maintain streamside vegetation to filter erosion ■ Plant surrounding land heavily with vegetation ■ Cut timber selectively ■ Use hay or straw bales as temporary measures along roadways. Plant afterwards.
Plowed Fields	Tilling the planting rows downhill encourages runoff into the waterway.	■ Build a berm near lake edge. ■ Plow rows against the slope of the land to slow runoff. ■ Plant lakeside vegetation. ■ Plow only where seeds are planted; untouched soil and residue holds soil and seeds.
Crops	Like lawns, excess use of pesticides or fertilizers may be washed into waterways.	■ Use chemicals appropriately and based on soil test results. ■ Plant cover crops in between growing seasons; they hold the soil and reduce the need for fertilizer. ■ Rotate crops to give soil a rest
Manure	Excess or improper application of this natural fertilizer and the contaminants in it can easily be carried into waterways.	■ Use water tanks for livestock and fence them away from waterways. This protects stream-banks from erosion and keeps manure away from the water.